What is claimed is:

1   1.   A method for determining an upsell of a purchase at a point-of-sale terminal, comprising:

2   generating a purchase price of the purchase;

3   generating a rounded price;

4   calculating a round-up amount, the round-up amount being a difference between the

5 purchase price and the rounded price;

6   determining an upsell in dependence on the round-up amount; and

7   outputting a signal indicative of the upsell.

1   2.   The method of claim 1 in which the step of generating a rounded price comprises:

2   generating the rounded price based on the purchase price.

1   3.   The method of claim 2 in which the step of generating the rounded price based on the

2 purchase price comprises:

3   determining a rounding multiple that corresponds to the purchase price; and

4   rounding the purchase price in accordance with the rounding multiple, thereby generating

5 the rounded price.

1   4.   The method of claim 1 in which the step of generating a rounded price comprises:

2   setting the rounded price to a first value if the purchase does not include a predetermined

3 item; and

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4 setting the rounded price to a second value if the purchase includes a predetermined item,

5 the second value being greater than the first value, the first value and the second value being

6 based on the purchase price.

1 5. The method of claim 4 in which the second value is established so that the round-up

2 amount is within a predetermined range.

1 6. The method of claim 1 in which the step of generating a rounded price comprises:

2 determining a rounding multiple based on whether the purchase includes a predetermined

3 item; and

4 rounding the purchase price in accordance with the rounding multiple, thereby generating

5 the rounded price.

1 7. The method of claim 1 in which the step of generating a rounded price comprises:

2 setting the rounded price to a first value if the purchase does not include a premium item;

3 and

4 setting the rounded price to a second value if the purchase includes a premium item, the

5 second value being greater than the first value, the first value and the second value being based

6 on the purchase price.

1 8. The method of claim 1 in which the step of generating a rounded price comprises:

2 determining a rounding multiple based on whether the purchase includes a premium item;

3 and

4   rounding the purchase price in accordance with the rounding multiple, thereby generating

5   the rounded price.

1   9.   The method of claim 1 in which the step of generating a rounded price comprises:

2   counting a number of premium items included in the purchase;

3   setting the rounded price to a first value if the number of premium items is less than a

4   predetermined threshold; and

5   setting the rounded price to a second value if the number of premium items is greater than

6   a predetermined threshold, the second value being greater than the first value, the first value and

7   the second value being based on the purchase price.

1   10.   The method of claim 1 in which the step of generating a rounded price comprises:

2   determining a rounding multiple based on the number of premium items; and

3   rounding the purchase price in accordance with the rounding multiple, thereby generating

4   the rounded price.

1   11.   The method of claim 1 in which the step of generating a rounded price comprises:

2   generating a rounded price based on a price of at least one predetermined item.

1   12.   The method of claim 1 in which the step of generating a rounded price comprises:

2   determining prices of items included in the purchase;

3   determining a maximum price of the determined prices; and

4   generating a rounded price based on the maximum price.

1   13.   A method for generating a coupon, comprising:

2   generating a purchase price of a purchase;

3   generating a rounded price;

4   calculating a round-up amount, the round-up amount being a difference between the

5   purchase price and the rounded price; and

6   printing on the coupon an identifier based on the round-up amount.

1   14.   A method for generating a coupon, comprising:

2   generating a purchase price of a purchase;

3   generating a rounded price;

4   calculating a round-up amount, the round-up amount being a difference between the

5   purchase price and the rounded price;

6   setting a coupon value based on the round-up amount; and

7   printing on the coupon an identifier that is based on the coupon value.

1   15.   The method of claim 14 further comprising:

2   setting a coupon feature based on a condition;

3   and in which the step of printing comprises

4   printing an identifier that is based on the coupon value and the coupon feature.

1   16.   The method of claim 15 in which the coupon feature is a validity period.

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1   17.   The method of claim 16 in which the step of setting a coupon feature based on a

2   condition comprises:

3   determining a time of a previous transaction;

4   determine a time interval since the previous transaction; and

5   setting the validity period based on the time interval since the previous transaction.

1   18.   The method of claim 17 in which the step of setting the validity period based on the time

2   interval since the previous transaction comprises

3   setting the validity period to be shorter than the time interval since the previous

4   transaction.

1   19.   The method of claim 17 further comprising:

2   receiving a customer identifier;

3   and in which the step of determining a date of a previous transaction comprises:

4   determining a date of a previous transaction that is based on the customer identifier.

1   20.   The method of claim 16 in which the step of setting a coupon feature based on a

2   condition comprises:

3   determining a current time; and

4   setting the validity period based on the current time.

1   21.   The method of claim 20 in which the step of setting the validity period based on the

2   current time comprises:

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3   setting the validity period to exclude an interval that corresponds to the current time.

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1   22.   The method of claim 16 in which the coupon feature is a required item.

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1   23.   The method of claim 22 in which the step of setting a coupon feature based on a

2   condition comprises:

3   receiving a customer identifier;

4   determining a coupon redemption that is based on the customer identifier; and

5   setting the required item based on the coupon redemption.

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1   24.   The method of claim 23 in which the step of setting the required item based on the

2   coupon redemption comprises:

3   setting the required item to be a predetermined item if the coupon redemption is greater

4   than a predetermined threshold.

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1   25.   The method of claim 23 in which the step of setting the required item based on the

2   coupon redemption comprises:

3   determining an infrequent item that is based on the customer identifier; and

4   setting the required item to be the infrequent item if the coupon redemption is greater

5   than a predetermined threshold.

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1   26.   The method of claim 22 in which the step of setting a coupon feature based on a

2   condition comprises:

3   receiving a customer identifier;

4   determining a number of past purchases of an item, the number being based on the

5   customer identifier; and

6   setting the required item based on the number of past purchases of the item.

[handwritten: 15]   *[handwritten: 2]*

1   27. The method of claim 14 in which the step of setting a coupon value based on the round-

2   up amount comprises:

3   setting the coupon value based on the round-up amount and a condition.

[handwritten: 16]   *[handwritten: 15]*

1   28. The method of claim 27 in which the step of setting the coupon value based on the round-

2   up amount and a condition comprises:

3   determining whether the purchase includes coupon redemption;

4   setting the coupon value to a first value if the purchase includes coupon redemption;

5   setting the coupon value to a second value if the purchase does not include coupon

6   redemption, the second value being greater than the first value, the first value and the second

7   value being based on the round-up amount.

[handwritten: 17]   *[handwritten: 15]*

1   29. The method of claim 27 in which the step of setting the coupon value based on the round-

2   up amount and a condition comprises:

3   determining a payment type; and

4   setting the coupon value based on the payment type.

[handwritten: 33]

1 30. The method of claim 29 in which the step of setting the coupon value based on the round-

2 up amount and a condition comprises:

3   determining whether a payment type is currency;

4   setting the coupon value to a first value if the payment type is currency; and

5   setting the coupon value to a second value if the payment type is not currency, the second

6 value being greater than the first value, the first value and the second value being based on the

7 round-up amount.

1 31. The method of claim 27 in which the step of setting the coupon value based on the round-

2 up amount and a condition comprises:

3   determining whether a frequent shopper identifier is received;

4   setting the coupon value to a first value if a frequent shopper identifier is received; and

5   setting the coupon value to a second value if no frequent shopper identifier is received,

6 the second value being greater than the first value, the first value and the second value being

7 based on the round-up amount.

1 32. The method of claim 27 in which the step of setting the coupon value based on the round-

2 up amount and a condition comprises:

3   receiving a customer identifier;

4   determining a coupon redemption that is based on the customer identifier; and

5   setting the coupon value based on the coupon redemption.

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1   33.   The method of claim 32 in which the step of setting the coupon value based on the

2   coupon redemption comprises:

3   determining a number of transactions based on the customer identifier;

4   determining a number of coupons redeemed based on the customer identifier;

5   calculating a redemption rate based on the number of coupons redeemed and the number

6   of transactions; and

7   setting the coupon value based on the redemption rate.

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1   34.   The method of claim 27 in which the step of setting the coupon value based on the round-

2   up amount and a condition comprises:

3   receiving a customer identifier;

4   determining an acceptance rate that is based on the customer identifier; and

5   setting the coupon value based on the acceptance rate.

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1   35.   The method of claim 27 in which the step of setting the coupon value based on the round-

2   up amount and a condition comprises:

3   receiving a customer identifier;

4   determining a number of transactions that is based on the customer identifier; and

5   setting the coupon value based on the number of transactions.

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1   36.   The method of claim 35 in which the step of setting the coupon value based on the

2   number of transactions comprises:

3   setting the coupon value to a first value if the number of transactions does not correspond

4   to a multiple of a predetermined number; and

5   setting the coupon value to a second value if the number of transactions corresponds to a

6   multiple of a predetermined number, the second value being greater than the first value, the first

7   value and the second value being based on the round-up amount.

1   37.   The method of claim 27 in which the step of setting the coupon value based on the round-

2   up amount and a condition comprises:

3   receiving a customer identifier;

4   determining a number of coupons redeemed that is based on the customer identifier; and

5   setting the coupon value based on the number of coupons redeemed.

1   38.   The method of claim 37 in which the step of setting the coupon value based on the

2   number of coupons redeemed comprises:

3   setting the coupon value to a first value if the number of coupons redeemed does not

4   correspond to a multiple of a predetermined number; and

5   setting the coupon value to a second value if the number of coupons redeemed

6   corresponds to a multiple of a predetermined number, the second value being greater than the

7   first value, the first value and the second value being based on the round-up amount.

1   39.   The method of claim 14, in which the identifier comprises a bar code.

1   40.   The method of claim 39, further comprising:

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2 encoding the coupon value in the bar code.

1 41. The method of claim 39, further comprising:

2 encoding a coupon feature in the bar code.

1 42. The method of claim 14, further comprising:

2 storing the coupon value in a record that is determinable from the identifier.

1 43. A method for generating a coupon, comprising:

2 generating a purchase price of a purchase;

3 generating a rounded price;

4 calculating a round-up amount, the round-up amount being a difference between the

5 purchase price and the rounded price;

6 printing on the coupon an indication of the round-up amount;

7 printing on the coupon an indication of an upsell;

8 receiving an indication of the round-up amount on a coupon; and

9 exchanging the round-up amount for the coupon.

1 44. The method of claim 43 in which the indication of a round-up amount comprises a bar

2 code.

1 45. A method for generating a coupon, comprising:

2 generating a purchase price of a purchase;

3   generating a rounded price;

4   calculating a round-up amount, the round-up amount being a difference between the

5   purchase price and the rounded price;

6   setting a coupon value based on a predetermined multiple of the round-up amount; and

7   printing on the coupon an identifier that is based on the coupon value.

1   46.   The method of claim 45 in which the step of setting a coupon value based on a

2   predetermined multiple of the round-up amount comprises:

3   setting the coupon value to three times the round-up amount.

1   47.   A method for generating a coupon, comprising:

2   generating a purchase price of a purchase;

3   generating a rounded price;

4   calculating a round-up amount, the round-up amount being a difference between the

5   purchase price and the rounded price;

6   determining whether the purchase includes coupon redemption; and

7   if the purchase includes coupon redemption,

8   setting a coupon value based on the round-up amount, and

9   printing on the coupon an identifier that is based on the coupon value.

1   48.   An apparatus for determining an upsell of a purchase at a point-of-sale terminal,

2   comprising:

3   a storage device; and

4   a processor connected to the storage device,

5   the storage device storing a program for controlling the processor; and

6   the processor operative with the program to:

7   generate a purchase price of the purchase;

8   generate a rounded price;

9   calculate a round-up amount, the round-up amount being a difference between the

10   purchase price and the rounded price;

11   determine an upsell in dependence on the round-up amount; and

12   output a signal indicative of the upsell.

1   49.   An apparatus for generating a coupon, comprising:

2   a storage device; and

3   a processor connected to the storage device,

4   the storage device storing a program for controlling the processor; and

5   the processor operative with the program to:

6   generate a purchase price of a purchase;

7   generate a rounded price;

8   calculate a round-up amount, the round-up amount being a difference between the

9   purchase price and the rounded price; and

10   print on the coupon an identifier based on the round-up amount.

1   50.   An apparatus for generating a coupon, comprising:

2   a storage device; and

3   a processor connected to the storage device,

4   the storage device storing a program for controlling the processor; and

5   the processor operative with the program to:

6   generate a purchase price of a purchase;

7   generate a rounded price;

8   calculate a round-up amount, the round-up amount being a difference between the

9   purchase price and the rounded price;

10   set a coupon value based on the round-up amount; and

11   print on the coupon an identifier that is based on the coupon value.

1   21.   An apparatus for generating a coupon, comprising:

2   a storage device; and

3   a processor connected to the storage device,

4   the storage device storing a program for controlling the processor; and

5   the processor operative with the program to:

6   generate a purchase price of a purchase;

7   generate a rounded price;

8   calculate a round-up amount, the round-up amount being a difference between the

9   purchase price and the rounded price;

10   print on the coupon an indication of the round-up amount;

11   print on the coupon an indication of an upsell;

12   receive an indication of the round-up amount on a coupon; and

13   exchange the round-up amount for the coupon.

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1   52.   An apparatus for generating a coupon, comprising:

2   a storage device; and

3   a processor connected to the storage device,

4   the storage device storing a program for controlling the processor; and

5   the processor operative with the program to:

6   generate a purchase price of a purchase;

7   generate a rounded price;

8   calculate a round-up amount, the round-up amount being a difference between the

9   purchase price and the rounded price;

10   set a coupon value based on a predetermined multiple of the round-up amount;

11 and

12   print on the coupon an identifier that is based on the coupon value.

1   53.   An apparatus for generating a coupon, comprising:

2   a storage device; and

3   a processor connected to the storage device,

4   the storage device storing a program for controlling the processor; and

5   the processor operative with the program to:

6   generate a purchase price of a purchase;

7   generate a rounded price;

8   calculate a round-up amount, the round-up amount being a difference between the

9   purchase price and the rounded price;

10   determine whether the purchase includes coupon redemption; and

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11 if the purchase includes coupon redemption,

12   set a coupon value based on the round-up amount, and

13   print on the coupon an identifier that is based on the coupon value.

1 54. A computer-readable medium encoded with a program for implementing a method for

2 determining an upsell of a purchase at a point-of-sale terminal, said processing instructions for

3 directing a computer to perform the steps of:

4 generating a purchase price of the purchase;

5 generating a rounded price;

6 calculating a round-up amount, the round-up amount being a difference between the

7 purchase price and the rounded price;

8 determining an upsell in dependence on the round-up amount; and

9 outputting a signal indicative of the upsell.

1 55. A computer-readable medium encoded with a program for implementing a method for

2 generating a coupon, said processing instructions for directing a computer to perform the steps

3 of:

4 generating a purchase price of a purchase;

5 generating a rounded price;

6 calculating a round-up amount, the round-up amount being a difference between the

7 purchase price and the rounded price; and

8 printing on the coupon an identifier based on the round-up amount.

1   56.   A computer-readable medium encoded with a program for implementing a method for

2   generating a coupon, said processing instructions for directing a computer to perform the steps

3   of:

4   generating a purchase price of a purchase;

5   generating a rounded price;

6   calculating a round-up amount, the round-up amount being a difference between the

7   purchase price and the rounded price;

8   setting a coupon value based on the round-up amount; and

9   printing on the coupon an identifier that is based on the coupon value.

1   57.   A computer-readable medium encoded with a program for implementing a method for

2   generating a coupon, said processing instructions for directing a computer to perform the steps

3   of:

4   generating a purchase price of a purchase;

5   generating a rounded price;

6   calculating a round-up amount, the round-up amount being a difference between the

7   purchase price and the rounded price;

8   printing on the coupon an indication of the round-up amount;

9   printing on the coupon an indication of an upsell;

10   receiving an indication of the round-up amount on a coupon; and

11   exchanging the round-up amount for the coupon.

1 58. A computer-readable medium encoded with a program for implementing a method for

2 generating a coupon, said processing instructions for directing a computer to perform the steps

3 of:

4   generating a purchase price of a purchase;

5   generating a rounded price;

6   calculating a round-up amount, the round-up amount being a difference between the

7 purchase price and the rounded price;

8   setting a coupon value based on a predetermined multiple of the round-up amount; and

9   printing on the coupon an identifier that is based on the coupon value.

1 59. A computer-readable medium encoded with a program for implementing a method for

2 generating a coupon, said processing instructions for directing a computer to perform the steps

3 of:

4   generating a purchase price of a purchase;

5   generating a rounded price;

6   calculating a round-up amount, the round-up amount being a difference between the

7 purchase price and the rounded price;

8   determining whether the purchase includes coupon redemption; and

9   if the purchase includes coupon redemption,

10   setting a coupon value based on the round-up amount, and

11   printing on the coupon an identifier that is based on the coupon value.